

Amendments to the Specification:

Please replace paragraph [0059] with the following amended paragraph:

[0059] Treatment of the copper under extremely carefully controlled conditions is important to maintain the desirable electrical properties of the copper. Figure [[5]] 8 is a bar chart illustrating the percentage shift in sheet resistance (Rs) exhibited by copper exposed to silane under a variety of conditions. Specifically, for examples 1-4 of Figure [[5]] 8, the copper was exposed for one second to silane flow rates of 175 sccm, 200 sccm, 225 sccm, and 250 sccm, respectively, following treatment of the copper with pure or dilute ammonia to remove the copper oxide. Figure [[5]] 8 indicates an undesirable steady increase in sheet resistance resulting from exposure to increased silane. Therefore, in accordance with embodiments of the present invention, it is important that the velocity of the vaporized silane be stabilized before chamber introduction, and carefully controlled during chamber introduction.

Please replace paragraph [0060] with the following amended paragraph:

[0060] The shift in sheet resistance illustrated in Figure [[5]] 8 may be dependent upon the form of the underlying copper. Figure [[8]] 5 plots percent change in sheet resistance (Rs) for ~~two different types of underlying copper structures. A first wafer bore a Cu seed blanket layer having a thickness of 1.2 kÅ. A second a wafer bore bearing a pattern of 5μ x 5μ copper traces having a thickness of 2 kÅ[[.]] Both wafer types were and~~ exposed to silane flowed at 250 sccm for 1 second. The results are summarized in the following TABLE.

TABLE

RECIPE	% SHIFT IN SHEET RESISTANCE	
wafer type	1.2 kÅ Cu Seed Blanket	2 kÅ Cu Patterned Traces
Dilute NH ₃	25	4.1
Pure NH ₃	19	5.0

This indicates that the shift in sheet resistance of silicided copper shown in the TABLE and Figure [[5]] 8, may depend upon the form of the underlying copper.